



200

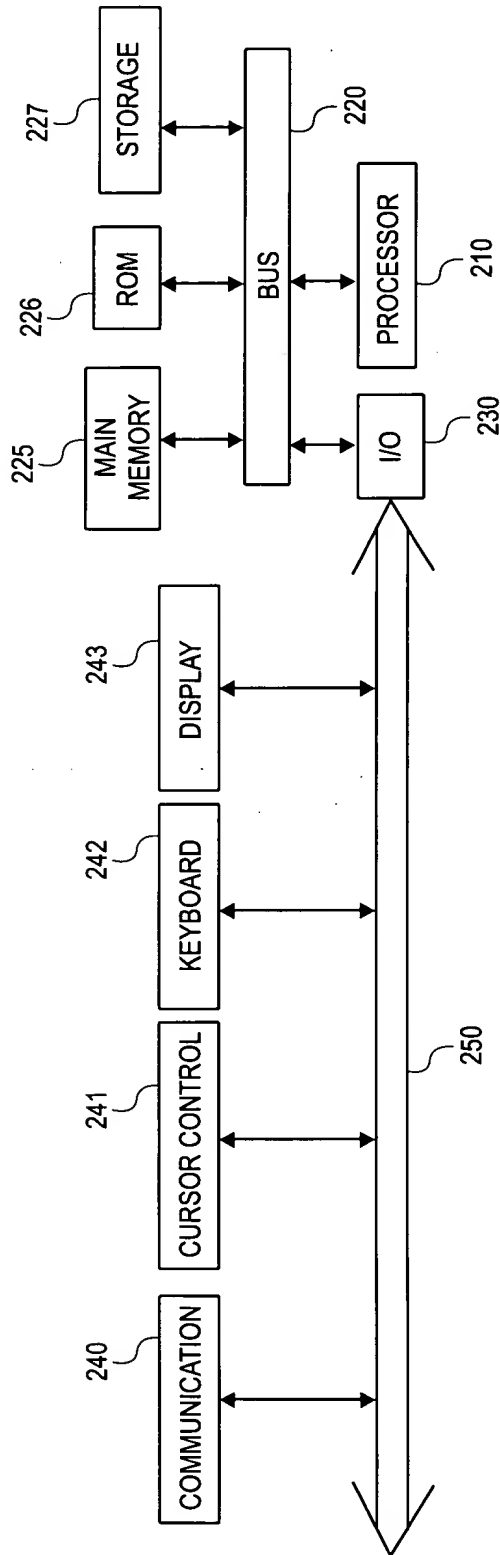


FIG. 1
(PRIOR ART)

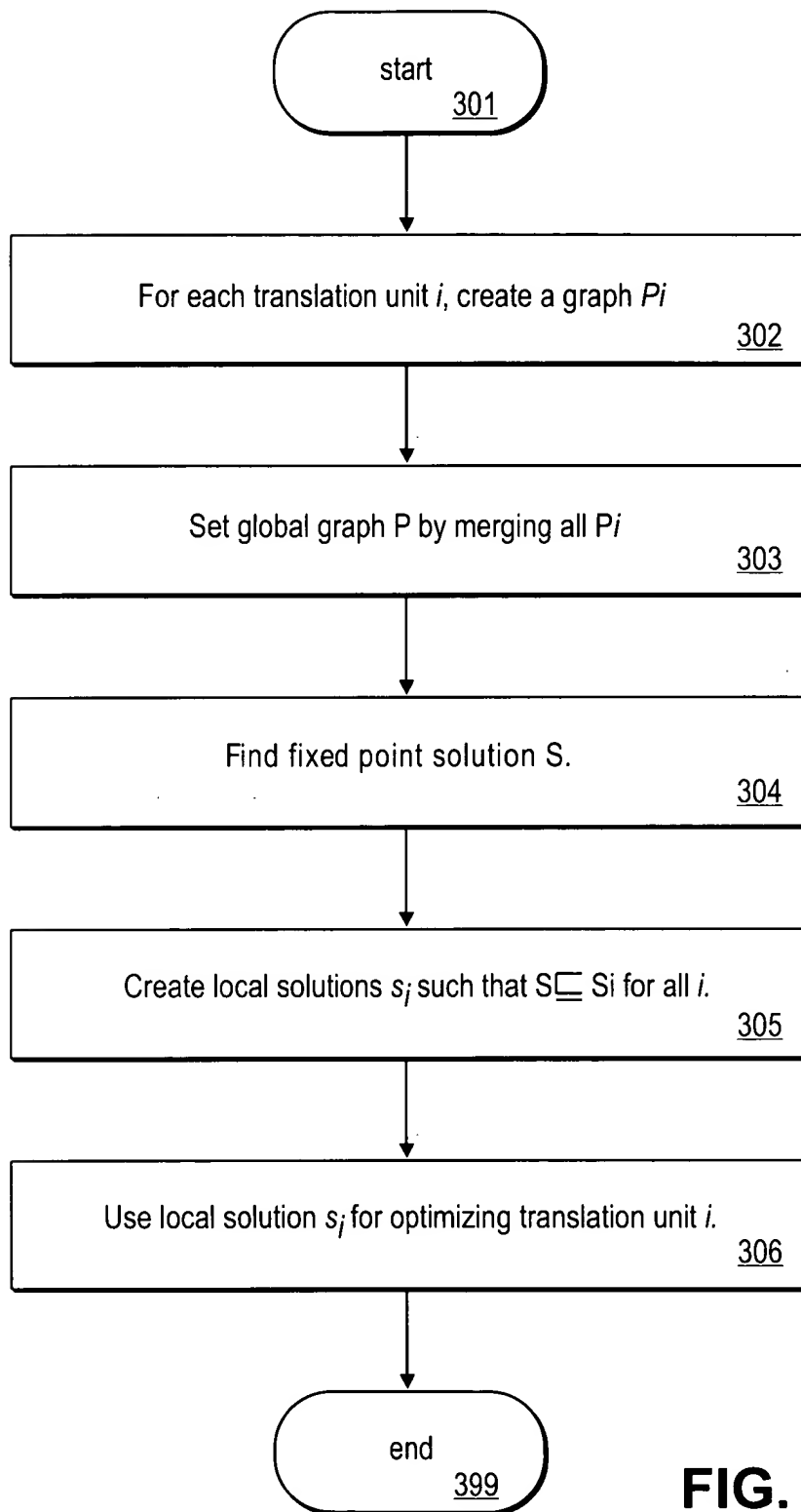


FIG. 3



Function	Function (x,y)
410 ~ TOP	(PURE,PURE)
420 ~ COPY	(y,y)
430 ~ IN_TO_LOST	if $y \leq l \Rightarrow (LOST,LOST)$ otherwise $\Rightarrow (PURE,PURE)$
440 ~ UNRETURN	
450 ~ COPY_AND_IN_TO_LOST	if $y = LOST \Rightarrow (LOST,LOST)$ otherwise $\Rightarrow (z,z)$ where $z = y \sqcup OI$
460 ~ CAT_FORMAL	if $y \leq l \Rightarrow (LOST,LOST)$ otherwise $\Rightarrow (y,y)$
470 ~ CAT_ACTUAL	(y,PURE)
	(PURE,y)
480 ~ GATE	if $x = LOST \Rightarrow (LOST,LOST)$ else if $x < R \Rightarrow (z,z)$ where $z = (x \sqcap OI) \sqcap y$ else $\Rightarrow (z,z)$ where $z = (x \sqcup OI)$

FIG. 4A